



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/884,925	06/21/2001	Jack Chen	MSI P0054 USA	3893

43831 7590 08/02/2006

BERKELEY LAW & TECHNOLOGY GROUP
1700NW 167TH PLACE
SUITE 240
BEAVERTON, OR 97006

EXAMINER

VILLECCO, JOHN M

ART UNIT	PAPER NUMBER
----------	--------------

2622

DATE MAILED: 08/02/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/884,925	CHEN ET AL.	
	Examiner	Art Unit	
	John M. Villecco	2622	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 May 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 15-21 and 28-41 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 15-21 and 28-41 is/are rejected.
- 7) ☒ Claim(s) 18 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 21 June 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

1. Applicant has amended 15-21 and 28-34 in an attempt to overcome the objections and rejections set forth by the examiner in the previous office action. Applicant's amendment appears to overcome the prior art of record. Additionally, applicant has added new claims 35-41. However, the examiner has found art, which was previously cited, that can be read on the claims. Please see the new grounds of rejection presented on the following pages.

Claim Objections

2. Claim 18 is objected to because of the following informalities:
- In line 2 of claim 18, Berstis recites the limitation "said photoelectrical converting element". This appears to be a typographical error and that the applicant meant to use the phrase – said photoelectric converting element – since this is the phrase used in the previous claims.

Appropriate correction is required.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Art Unit: 2622

4. Claims 15-21 and 28-41 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. More specifically, in each of the independent claims applicant recites some variation of capturing image and sound signals and based on whether or not the sound matches a predetermined data, a multimedia data file comprised of information derived from the image and sound data. According to this wording, a user captures and analyzes the sound data, and if the sound meets a specific criteria the captured image and sound are combined into a multimedia file. However, the examiner can find no mention in the specification of analyzing sound data and combining that same sound data into the multimedia file. Page 6, line 19 to page 7, line 14 discusses matching voice data to a predetermined data. However, it is clear from this passage that the sound data being combined into the multimedia image file is not the sound data being analyzed and matched to a predetermined data. Furthermore, in this passage the applicant calls this analyzed sound data and “analog signal of a third electric level”, and it is never disclosed that this third analog signal is combined with the image data to form a multimedia image file.
5. Additionally, claim 34 includes the newly added limitation of the “processor is capable of producing the multimedia data file at least in part via multitasking” (emphasis added). The only mentioning of multitasking occurs on page 5, lines 3-4 and page 6, lines 13-15. These passages state that the only way that the processor produces the

Art Unit: 2622

multimedia data file is by multitasking. However, there is no disclosure in the specification of the multimedia data file being made in part by multitasking. Thus, this subject matter constitutes new matter.

Claim Rejections - 35 USC § 102

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

7. **Claims 15-17, 35-37 and 39-41 are rejected under 35 U.S.C. 102(e) as being anticipated by Berstis (U.S. Patent No. 6,721,001).**

8. Regarding ***claim 15***, Berstis discloses a digital camera with voice recognition annotation. More specifically, Berstis discloses a an image pickup device (image sensor, 204) for receiving an image signal and transforming it into a first analog signal, a sound pickup device (microphone, 210) for receiving a sound signal and transforming it into a second analog signal, a first A/D converter (A/D converter, 206) connected to the image pickup device (image sensor, 204) for converting the first analog signal to a first digital signal, a second A/D converter (A/D converter, 212) connected to the sound pickup device (microphone, 210) for converting the second analog signal into a second digital signal, and a processor (microprocessor, 208) connected to the first and second

Art Unit: 2622

A/D converters (206, 212) for producing a multimedia data file. See Figure 2 and column 2, line 51 to column 3, line 8. The voice recognition unit (224) uses voice recognition data (225) to generate text annotations to associate with each image. In this embodiment the voice recognition data is interpreted to be the predetermined data. See column 3, lines 40-54. After capturing the image, sound, and text annotations they are stored in a single data block as shown in Figure 5. This data block is interpreted to be the multimedia data file.

9. As for **claim 16**, Berstis discloses a lens (202) and an image sensor (204) for generating the first analog signal. Berstis discloses that the image sensor can be a CCD or CMOS image sensor, which inherently would include a photoelectric converting element.

10. With regard to **claim 17**, Berstis discloses that the image sensor (204) can be a CCD. See column 2, lines 57-58.

11. **Claim 35** is considered substantively equivalent to claim 15. Please see the discussion of claim 15 on the preceding pages.

12. **Claim 36** is considered substantively equivalent to claim 16. Please see the discussion of claim 16 on the preceding pages.

13. **Claim 37** is considered substantively equivalent to claim 17. Please see the discussion of claim 17 on the preceding pages.

14. As for **claim 39**, Berstis discloses using an image sensor. It is common knowledge that reading charge out of an image sensor is called scanning. Thus, the image sensor is a scanning device.

Art Unit: 2622

15. **Claim 40** is considered substantively equivalent to claim 15. Please see the discussion of claim 15 on the preceding pages.

16. **Claim 41** is considered substantively equivalent to claim 16. Please see the discussion of claim 16 on the preceding pages.

Claim Rejections - 35 USC § 103

17. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

18. **Claims 18 and 38 are rejected under 35 U.S.C. 103(a) as being unpatentable over Berstis (U.S. Patent No. 6,721,001) in view of Maxium Technologies (Internet Publication, 2000).**

19. Regarding **claims 18 and 38**, as mentioned above in the discussion of claim 16 and 35, respectively, Berstis discloses all of the limitations of the parent claim.

However, Berstis fails to explicitly state that the image sensor is a CIS. The Maxium Technologies Publication on the other hand, discloses that the use of contact image sensors (CIS) is well known in the art. The integration of CIS image sensors reduces the space needed for other components allowing for thinner and lighter products.

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to use a CIS image sensor instead of the CCD image sensor in Berstis so that the camera is made smaller and lighter.

20. **Claim 19 is rejected under 35 U.S.C. 103(a) as being unpatentable over Berstis (U.S. Patent No. 6,721,001) in view of Ochi et al. (U.S. Patent No. 6,233,014).**

21. Regarding **claim 19**, as mentioned above in the discussion of claim 16, Berstis discloses all of the limitations of the parent claim. However, Berstis fails to explicitly disclose a reflection mirror for transmitting the image signal to the lens. Ochi, on the other hand, discloses that it is well known in the art to include a mirror for directing incoming light to a lens. More specifically Ochi discloses a mirror (14) for directing the incoming light to a lens (17). See Figure 1 and column 4, lines 18-29. This camera arrangement serves as an alternative arrangement for capturing an image. A line sensor camera can be made cheaper and smaller than a full image sensor camera. See column 4, lines 26-29. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to construct the camera of Berstis in a manner similar to Ochi so that the camera can be made more cheaply and smaller.

22. **Claims 20 and 21 are rejected under 35 U.S.C. 103(a) as being unpatentable over Berstis (U.S. Patent No. 6,721,001) in view of Haranishi (U.S. Patent No. 5,764,779).**

23. Regarding **claim 20**, as mentioned above in the discussion of claim 15, Berstis discloses all of the limitations of the parent claim. Berstis, however, fails to explicitly state that the microphone includes a filter for filtering off a noise signal from the analog

Art Unit: 2622

signal. Haranishi, on the other hand, discloses that it is well known in the art to provide filters in a microphone for filter off noise. More specifically, Haranishi discloses a bandpass filter (2) for filter out noise from a microphone (1) and allowing only desired frequencies to pass. This feature allows for the microphone to only allow frequencies of the human voice to pass, thus increasing the quality of the signal. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include a filter in the microphone of Hashimoto so that a higher quality sound signal is generated.

24. As for **claim 21**, Haranishi discloses only allowing frequencies of the human voice to pass through the bandpass filter (2). See the abstract.

25. **Claims 28 and 29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto et al. (U.S. Patent No. 6,111,604) in view of Allen et al. (U.S. Patent No. 5,737,491).**

26. Regarding **claim 28**, Hashimoto discloses a digital camera capable of detecting connection to an external device and transmitting image and sound data to the external device. More specifically, Hashimoto discloses an image pickup device (photographing portion, 6) for generating a image digital signal of an object, a sound pickup device (microphone, 1 and A/D converter, 4) for generating a sound digital signal, a multiplexer and a processor (CPU, 23 and FIFO circuit, 23) for combining the digital image and sound signals and producing a single file for transmission to the external device.

Hashimoto, however, fails to explicitly disclose producing the multimedia image file if the sound signal matches predetermined data. Allen on the other hand, discloses that it is well known in the art to input audio information indicating a processing action. More specifically, Allen discloses that after capturing an image, the user verbally instructs the camera to perform certain functions. This is done by comparing the words spoken by the user to a code book (25). After recognizing the word, the word is appended to the image and sent to the fulfillment server (34). By allowing a user to verbally enter instructions, image processing or transfer can be accomplished faster and more speedily (col. 1, lines 57-59). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to allow the user of the camera of Hashimoto to enter commands verbally so that processing and transmission can occur faster.

27. As for **claim 29**, Hashimoto discloses an A/D converter (4) for converting the analog signal from the CCD (9) to the image digital signal and another A/D converter (4) for converting a sound analog signal from the microphone (1) to the sound digital signal.

28. **Claims 30 and 31 rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto et al. (U.S. Patent No. 6,111,604) in view of Allen et al. (U.S. Patent No. 5,737,491) and further in view of Ochi et al. (U.S. Patent No. 6,233,014).**

29. Regarding **claim 30** as mentioned above in the discussion of claim 29 the combination of Hashimoto and Allen discloses all of the limitations of the parent claim. Additionally, Hashimoto discloses a lens (6) and an image sensor (9) for generating an

Art Unit: 2622

analog signal. However, Berstis fails to explicitly disclose a reflection mirror for transmitting the image signal to the lens. Ochi, on the other hand, discloses that it is well known in the art to include a mirror for directing incoming light to a lens. More specifically Ochi discloses a mirror (14) for directing the incoming light to a lens (17). See Figure 1 and column 4, lines 18-29. This camera arrangement serves as an alternative arrangement for capturing an image. A line sensor camera can be made cheaper and smaller than a full image sensor camera. See column 4, lines 26-29. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to construct the camera of Berstis in a manner similar to Ochi so that the camera can be made more cheaply and smaller.

30. As for **claim 31**, Hashimoto discloses that the image sensor (9) is a CCD.

31. **Claim 32 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto et al. (U.S. Patent No. 6,111,604) in view of Allen et al. (U.S. Patent No. 5,737,491) and further in view of Ochi et al. (U.S. Patent No. 6,233,014) and of Maxium Technologies (Internet Publication, 2000).**

32. Regarding **claim 32**, as mentioned above in the discussion of claim 30, Hashimoto discloses all of the limitations of the parent claim. However, Hashimoto fails to explicitly state that the image sensor is a CIS. The Maxium Technologies Publication on the other hand, discloses that the use of contact image sensors (CIS) is well known in the art. The integration of CIS image sensors reduces the space needed for other components allowing for thinner and lighter products. Therefore, it would have been

Art Unit: 2622

obvious to one of ordinary skill in the art at the time the invention was made to use a CIS image sensor instead of the CCD image sensor in Hashimoto so that the camera is made smaller and lighter.

33. **Claim 33 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hashimoto et al. (U.S. Patent No. 6,111,604) in view of Allen et al. (U.S. Patent No. 5,737,491) and further in view of Haranishi (U.S. Patent No. 5,764,779).**

34. Regarding **claim 33**, as mentioned above in the discussion of claim 29, Hashimoto discloses all of the limitations of the parent claim. Hashimoto, however, fails to explicitly state that the microphone includes a filter for filtering off a noise signal from the analog signal. Haranishi, on the other hand, discloses that it is well known in the art to provide filters in a microphone for filter off noise. More specifically, Haranishi discloses a bandpass filter (2) for filter out noise from a microphone (1) and allowing only desired frequencies to pass. This feature allows for the microphone to only allow frequencies of the human voice to pass, thus increasing the quality of the signal. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include a filter in the microphone of Hashimoto so that a higher quality sound signal is generated.

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP

Art Unit: 2622

§ 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

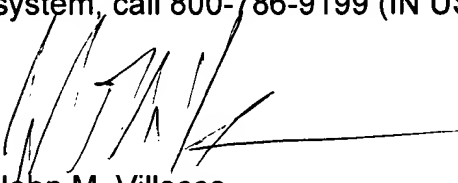
A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to John M. Villecco whose telephone number is (571) 272-7319. The examiner can normally be reached on Monday-Friday.

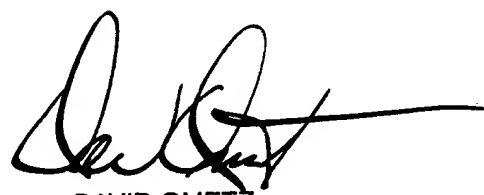
If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Ometz can be reached on (571) 272-7593. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2622

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



John M. Villecco
July 25, 2006



DAVID OMETZ
SUPERVISORY PATENT EXAMINER